CLAIMS:

1.-13. (cancelled).

14. (new) A method for production of a connection between a mobile station and a communication network, comprising the steps of:

automatically performing identification processes which identify usable connection options to different networks having different standards and frequency bands, wherein a first standard is selected and a check is carried out of the usable connection options within this first standard, then a next standard is selected and a check is carried out of the usable connection options within this next standard, and wherein connection parameters which identify the standard with which a usable connection option is found are stored;

selecting a usable connection option; and

setting up a connection from the mobile station to the network via an access point after selection of connection parameters, wherein the connection is set up by the mobile station to the access point which is being communicated to via the standard for which the usable connection option has been selected.

- 15. (new) The method of claim 14 wherein selecting a usable connection option comprises selection under program control
- 16. (new) The method of claim 14 wherein selecting a usable connection option comprises manual selection.

- 17. (new) The method as claimed in claim 14 wherein selecting a usable connection option comprises selecting the connection option which achieves the maximum data throughput.
- 18. (new) The method as claimed in claim 14 wherein an identification process and data storage are carried out before logging on a connection with an access point.
- 19. (new) The method as claimed in claim 14 wherein an identification process and data storage are carried out while a connection exists to an access point.
- 20. (new) The method as claimed in claim 19 wherein before the identification process is carried out, a current access point is signaled that the mobile station cannot receive data for an agreed time, and arriving data is buffered in the current access point.
- 21. (new) The method as claimed in claim 19, wherein the mobile station logs off the current access point which is carrying out the identification process, before the identification process is carried out, and wherein the mobile station logs on with the same access point or with another access point after the completion of the identification process.
- 22. (new) The method as claimed in claim 14 wherein the automatic identification and the data storage and updating processes are carried out within a time period in which no data is transmitted and during which the mobile station is not busy carrying out other processes that cannot be interrupted.
- 23. (new) The method as claimed in claim 14 wherein the identification and the data storage and updating connection option processes are carried out periodically.

- 24. (new) The method of claim 14 wherein the identification of usable connection options is carried out by transmission of a signal to possible access points and by evaluation of the received signal or just by evaluation of the received signal.
- 25. (new) The method of claim 14 wherein the identification of usable connection options is carried out in a data transmission pause during an active connection to an access point.
- 26. (new) The method of claim 14 wherein in the event of a deterioration in the transmission quality or a connection failure to the current access point, after accessing the stored data or another identification process, a connection change is made to an access point which ensures a better transmission quality.
- 27. (new) The method of claim 14 wherein switching to different standards and frequency bands is carried out under program control or by rebooting a processor.
 - 28. (new) The method of claim 14 further comprising:

carrying out a periodic comparison between the connection parameters to the current access point and other connection options; and

making a change to another connection option automatically or manually.